

Title (en)  
CLAPPER-TYPE ELECTROMAGNETIC RELEASE FOR MINIATURE CIRCUIT BREAKER

Title (de)  
KLAPPENARTIGE ELEKTROMAGNETISCHE AUSLÖSUNG FÜR MINIATURSCHUTZSCHALTER

Title (fr)  
DÉCLENCHEUR ÉLECTROMAGNÉTIQUE DE TYPE À CLAPET POUR DISJONCTEUR MINIATURE

Publication  
**EP 3703097 B1 20220713 (EN)**

Application  
**EP 18870083 A 20181017**

Priority  
• CN 201711014353 A 20171026  
• CN 2018110716 W 20181017

Abstract (en)  
[origin: EP3703097A1] A clapper-type electromagnetic release for a miniature circuit breaker is characterized by comprising an armature (1), a magnet yoke (2), a coil (3), an iron core (4), a shaft (5), and an armature torsion spring (6). The iron core (4) is mounted on the magnet yoke (2). The coil (3) is sleeved on the iron core (4). The armature (1) is mounted on the shaft (5) and can rotate around the shaft (5). The armature torsion spring (6) is mounted on the shaft (5). The armature torsion spring (6) presses against the armature (1), so that the armature (1) can be reset. In the clapper-type electromagnetic release for a miniature circuit breaker in the present invention, by means of the rotation of the armature, the armature is not closed in absorption and the circuit breaker mechanism is not tripped within a specified current range; and when the specified current range is exceeded, the armature is closed in absorption and the armature claps a lock, so that the circuit breaker mechanism is tripped, thereby improving the safety performance of the circuit breaker.

IPC 8 full level  
**H01H 71/24** (2006.01)

CPC (source: CN EP KR US)  
**H01H 50/02** (2013.01 - US); **H01H 50/18** (2013.01 - US); **H01H 50/36** (2013.01 - US); **H01H 71/24** (2013.01 - CN KR US);  
**H01H 71/2454** (2013.01 - EP); **H01H 71/2472** (2013.01 - EP); **H01H 50/24** (2013.01 - EP); **H01H 50/36** (2013.01 - EP); **H01H 51/06** (2013.01 - EP)

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

DOCDB simple family (publication)  
**EP 3703097 A1 20200902**; **EP 3703097 A4 20201104**; **EP 3703097 B1 20220713**; AU 2018357312 A1 20200521; AU 2018357312 B2 20210805; BR 112020008367 A2 20201103; CA 3079990 A1 20190502; CA 3079990 C 20230822; CN 107887237 A 20180406; JP 2021500733 A 20210107; JP 6958780 B2 20211102; KR 102393050 B1 20220429; KR 20200060769 A 20200601; US 11302503 B2 20220412; US 2020350135 A1 20201105; WO 2019080762 A1 20190502

DOCDB simple family (application)  
**EP 18870083 A 20181017**; AU 2018357312 A 20181017; BR 112020008367 A 20181017; CA 3079990 A 20181017; CN 201711014353 A 20171026; CN 2018110716 W 20181017; JP 2020543676 A 20181017; KR 20207014121 A 20181017; US 201816758557 A 20181017